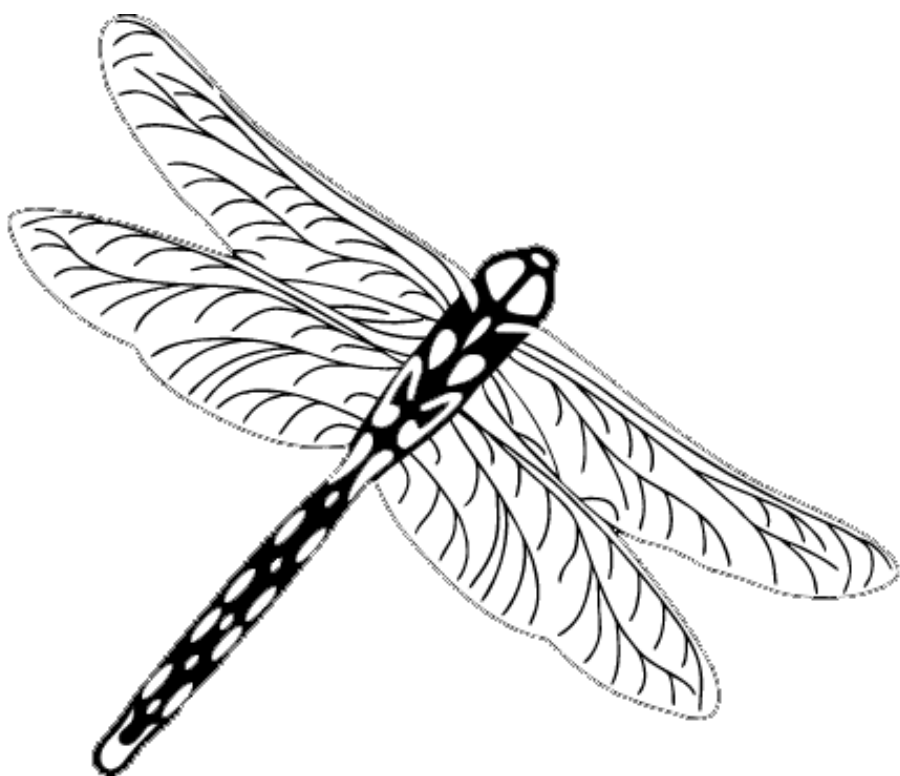


2011

Hoosier Riverwatch Database Manual



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INTRODUCTION

The Hoosier Riverwatch Volunteer Stream Monitoring database went online in the fall of 2001. Hoosier Riverwatch is extremely interested in your results and we strongly encourage you to share your data by entering it online at www.HoosierRiverwatch.com. This database is yours, giving you a location to store and retrieve your data. Entry in this database also makes your data accessible to the public, other volunteers, agencies, and anyone interested in Indiana's water quality.

To enter your stream data, you first need to register yourself, your group, and your stream site through the database. Instructions for database registration are provided on the following pages. **Only data collected by trained Riverwatch volunteers may be entered in the statewide online database.** You will need the database password to register and submit data. You may write it here:

The database can be reached through www.HoosierRiverwatch.com.

Due to the limited number of Hoosier Riverwatch program staff, volunteers are encouraged to enter their data through this system. If you don't have a computer or internet access at home, most libraries have public internet access. Another option is to partner with a school or local organization (i.e. Soil and Water Conservation District) that may have a computer and internet access.

Keep Hard Copies of Your Datasheets!

Make sure to keep your field data sheets. You may need them several months later if you or we question a result when checking the database. The problem may be a simple data entry error.

REGISTER NEW USER

I. NEW USER REGISTRATION

Directions: Please fill out the following form. The Continue button will not become active until all items are successfully completed.

*Password:

*First Name:

*Last Name:

*Email:

*Street Address:

*City:

*State:

*Zip Code:

*Phone Number:

Would you like your information to appear in the Hoosier Riverwatch Mentoring Directory? ☐ [What does this mean?](#)

ARE YOU COLLECTION DATA AS A MEMBER OF OF ORGANIZATION?

No, I am **not** collecting for an organization. ☐

Yes, I am collecting for an organization ☐

CONTINUE

Creating a new user in the Hoosier Riverwatch program is quite simple. Please be sure to fill out all the required fields as noted by the * in front of their title. If you would like to be included in the Hoosier Riverwatch Directory, please check the box. This directory will be available online and will include your name and email address so that other volunteers may contact you. It will only be accessible by Riverwatch volunteers.

If you are collecting data as a member of an organization, please check the button “*Yes, I am collecting for an organization.*” If you are not collecting for an organization, you may check “*No, I am not collecting for an organization.*”

For those users **not collecting for an organization**, clicking the Continue button will register you into the system and generate a Volunteer ID. Please record this number or print the page for your records. You will need this Volunteer ID. An email confirmation will also be sent to the email on file.

For those users **collecting for an organization**, you will be asked to select your organization from a list of current organizations in our system. Please look carefully to see if your organization is already listed. If you find your organization, select

from the drop down and hit the Continue button. Clicking the Continue button will register you into the system and generate a Volunteer ID. Please record this number or print the page for your records. You will need this Volunteer ID. An email confirmation will also be sent to the email on file.

If you do not find your organization in the drop down menu, then you need to register your organization with Hoosier Riverwatch. Selecting the “My Organization Isn’t Listed” button will activate this process. Please be sure to fill out all the information accurately. By creating this account, you will be the Organization’s contact with Hoosier Riverwatch. Clicking the Continue button will register you AND your organization into the system and generate a Volunteer ID. Please record this number or print the page for your records. You will need this Volunteer ID. An email confirmation will also be sent to the email on file. There is no Organization ID.

REGISTER NEW SITE

Note: Before you begin registering a new site with Hoosier Riverwatch, please see if someone is already sampling in your area. With over 1200 sites already on record, there is a possibility that your site is already being sampled. Please see the Explore Sites feature of the DataWatch feature of the website. If someone is already sampling at the location, you may simple use that Site ID as your valid sampling location!

Registering a new site with Hoosier Riverwatch can be done only after you have already registered as a user and have a valid Volunteer ID. If you have this ID then fill out the information on the form. If you are not quite sure which watershed your sample site falls within, please view the watershed map in your Hoosier Riverwatch Manual.

To gather the most accurate data we can, please use the Site Locator feature of this page. This can be initialized by clicking the *“Launch Site Locator”* link next to the Latitude input box.

Zooming in and out using the "+" and "-" buttons or the set of vertical steps, locate your sampling site within this map. You will notice that a blue push pin will attempt to follow you around the page. Once you have found your sampling site, click on the blue push pin and drag it to the exact location on the map that you will sample. You will see that the latitude and longitude are calculated at the bottom of the open window and also are put into the latitude and longitude fields of the Register New Site form. You may close the Site Locator when you have finished.

Before submitting your site, take some time and write a small description of the area around your site. Use crossroads, bridges, and parks etc. as landmarks so other volunteers may know exactly where someone is already sampling.



Clicking the Continue button will register your site into the system and generate a Site ID. Please record this number or print the page for your records. You will need this Site ID. An email confirmation will also be sent to the email on file.

ENTER DATA

DATA ENTRY

Please fill out the following form. The Submit Details Button will not become active until all items are successfully completed. If you need further information about any of the items, please click the ? on the right hand side.

ACTION	PARAMETERS	DATA	STATUS	HELP
Password	Password found in Hoosier Riverwatch Manual	<input type="text"/>	REQUIRED	?
Volunteer ID	Created Online	<input type="text"/>	REQUIRED	?
Site ID	Created Online	<input type="text"/>	REQUIRED	?
# Adults	Min-Max (1-20)	Select	REQUIRED	?
# Students	Min-Max (1-30)	Select	REQUIRED	?
Date of Sample	mm/dd/yyyy	<input type="text"/>	REQUIRED	?
Time of Day	Be careful to identify am/pm	<input type="text"/> : <input type="text"/> AM	REQUIRED	?
Time Spent	Measured in .30 minutes intervals	Select	REQUIRED	?
Weather at Sample Time	Select weather at time of sampling	Select	REQUIRED	?
Past 48 hours	Select the worst weather in the past 48 hours prior to sampling	Select	REQUIRED	?

PERSONAL INFORMATION

Volunteer ID
First name

WATERBODY INFORMATION

Site ID
River Name
Watershed Name

NOTES:

Entering data into the Hoosier Riverwatch program can only be done by volunteers who have a valid Volunteer ID and Site ID. If you have these two items, you are ready to go!

The first step is to fill out all the information about the sampling trip. Typing your Volunteer ID will trigger the system to look and see if this is a valid id. Your Volunteer ID and First Name will appear in the lower left corner of the form. Is this you? If not, there is a good chance you have entered the wrong Volunteer ID. Doing the same think for the Site ID will show you the River Name and Watershed Name below. You may use the “?” in the far right of each column to find out more information about each data point, including looking up Volunteer and Site IDs. Use these as your guide if confused about what is being asked.

Once you have filled out all the required information, the “*Submit Details*” button will appear. Clicking this button will take you to the Parameter Selection page. **NOTE:** Please use the notes area to write anything unique about the day. Was the weather odd? Is there a drought?

PARAMETER SELECTION

Please select a parameter to begin entering your data. Upon data completion you will return to this page to select another parameter if applicable.

PERSONAL INFORMATION		WATERBODY INFORMATION	
Volunteer ID	123	Site ID	123
First name	Bob Cervelli	River Name	Yellow River
		Watershed Name	Kankakee
		DATE	
		Date	04/22/2011

SELECT PARAMETERS

CHEMICAL

BIOLOGICAL

FLOW

CQHEI

The **Parameter Selection** page is considered your home base for sampling. You will notice that your sampling specifics are stored in the system and displayed above the Parameter buttons. You will only select the parameters that you completed on the Date shown. Clicking on any of the parameters buttons will cause a browser window to occupy your entire screen. **You**

do NOT want to close this window at any time during the data entry of that parameter until you have submitted the data to the program or do not want to cancel your session with the program.

CHEMICAL PARAMETER EXAMPLE

HOOSIER RIVERWATCH				
TEST	EQUIPMENT OR METHOD	RESULT AVERAGE	WQI VALUE	
Temp/Temp Change	N/A	C	N/A	ENTER DATA
Dissolved Oxygen	N/A	mg/L	N/A	ENTER DATA
BOD5	N/A	BOD	N/A	--
pH	N/A	pH	N/A	ENTER DATA
Total Phosphates	N/A	mg/L	N/A	ENTER DATA
Orthophosphates	N/A	mg/L	N/A	ENTER DATA
Nitrates	N/A	mg/L	N/A	ENTER DATA
Nitrites	N/A	mg/L	N/A	ENTER DATA
Turbidity	N/A	mg/L	N/A	ENTER DATA
EColi Bacteria	N/A	C/1000	N/A	ENTER DATA
Site Specifics	-	-	WQI=N/A	--

Use the Enter Data button on the right to select which test you have completed during this sampling trip. When the Enter Data button is selected a form appears in the lower half of the screen. These screens contain input fields for your data. Follow the instructions and fill in all needed data. You will notice that the system will average all values (if needed) and calculate your Q and WQI value for each test. Be sure to select your sampling equipment if required. Once this data has been filled in, click the Continue button. This will trigger the data to be stored and available to the database once you complete all tests.

DATASHEET: pH

TEST PARAMETERS

STEP ONE: Input your sampling equipment.

Sampling Equipment Hach pH Pen

STEP TWO: Input up to three (3) samples into the boxes located to the right.

Sample 1 : units

Sample 2 : units

Sample 3 : units

AVE. PH:

STEP THREE: The averages of your samples will be used to generate a Q value.

Q Value

X .12 Weighting Factor

WQI

STEP FOUR: Click the Continue Button to store your results for entry to the database

CONTINUE

Notice after submitting a test that the results for that test appear above. You simply select the next test and repeat. At the completion of 6 of 8 necessary tests, a WQI is calculated. A Submit Dataset also appears after the completion of just one test. Remember, you can do as few or as many tests as you want and still submit to Hoosier Riverwatch. Your data has not been submitted into the Riverwatch system until you select the Submit Dataset and follow the steps.

After submitting the data you will see the screen below.

HOOSIER RIVERWATCH

DATA ENTRY COMPLETE

WHAT'S NEXT?

Now that you have submitted this recordset, what do you do now?

[Complete another parameter using the same Sampling Details](#)

or

[Enter New Data](#)

or

[Log Out](#)

Complete another parameter using the same Sampling Details

Select this option if you have another parameter (flow, chem., inverts, habitat) that needs to be entered for the same sampling specifics as the last sample. In other words, did you do another test on the same day and need to enter it now? Selecting this option will drop you back to the Parameter Selection page where you can make another choice.

Enter New Data

Select this option if you are done entering parameter data for a particular day, but want to create new Sampling Details for another day or site. Select this option will take you back to the Enter Data page where you can enter new sampling specifics.

DATA ENTRY CONCEPT MAP

Take a moment to review the concept map below. In order to submit data to the Riverwatch system you must have a valid user ID and site ID. Sampling day specifics are then asked for before choosing which parameters were tested that day. Completing each parameter's tests will submit the data to the system. From that point you can loop back and select another parameter and enter more results.

REGISTER NEW USER

1. NEW USER REGISTRATION

Directions: Please fill out the following form. The Continue button will not become active until all items are successfully completed.

*Username:

*First Name:

*Last Name:

*Email:

*Street Address:

*City:

*State:

*Zip Code:

*Phone Number:

Should you like your information to appear in the Hoosier Riverwatch Monitoring Directory? ☐ [View this page](#)

ARE YOU COLLECTING DATA AS A MEMBER OF AN ORGANIZATION?

No, I am not collecting for an organization. ☐

Yes, I am collecting for an organization. ☐

CONTINUE

REGISTER NEW SITE

1. NEW SITE REGISTRATION

Please fill out the form below. The Continue button will not become active until all items are successfully completed.

*Site ID:

*River Name:

*City:

*County:

*Nearest town:

If you do not know your site's latitude and longitude, please use the Site Locator tool. Otherwise, please enter your latitude and longitude in decimal degrees.

*Latitude:

*Longitude:

Description of site: Please describe the location of your sampling site using road names and other obvious landmarks.

CONTINUE

SELECT PARAMETERS

CHEMICAL

FLOW

BIOLOGICAL

CQHEI

ENTER SAMPLING DAY SPECIFICS

DATA ENTRY

Please fill out the following form. The Submit Details button will not become active until all items are successfully completed. If you need further information about any of the items, please click the ? on the right hand side.

ACTION	PARAMETERS	DATA	STATUS	HELP
Parameter	Measured based on Hoosier Riverwatch Method	<input type="text"/>	<input type="button" value="OK"/>	<input type="button" value="1"/>
Volume (L)	Measured Online	<input type="text"/>	<input type="button" value="OK"/>	<input type="button" value="1"/>
Site ID	Chosen Online	<input type="text"/>	<input type="button" value="OK"/>	<input type="button" value="1"/>
# Adults	See Map (0-20)	<input type="text"/>	<input type="button" value="OK"/>	<input type="button" value="1"/>
# Juveniles	See Map (0-20)	<input type="text"/>	<input type="button" value="OK"/>	<input type="button" value="1"/>
Date of Sample	mm/dd/yyyy	<input type="text"/>	<input type="button" value="OK"/>	<input type="button" value="1"/>
Time of Day	Be careful to specify AM/PM	<input type="text"/>	<input type="button" value="OK"/>	<input type="button" value="1"/>
Time Spent	Measured in 30 minutes intervals	<input type="text"/>	<input type="button" value="OK"/>	<input type="button" value="1"/>
Weather at Sample Time	Select weather at time of sampling	<input type="text"/>	<input type="button" value="OK"/>	<input type="button" value="1"/>
Time At Hours	Enter the exact number of the past 24 hours prior to sampling	<input type="text"/>	<input type="button" value="OK"/>	<input type="button" value="1"/>

PERSONAL INFORMATION

Volume (L):

First Name:

WATERBODY INFORMATION

Site ID:

River Name:

Nearest town:

NOTES:

SUBMIT PARAMETER DATA TO DATABASE

HOOSIER RIVERWATCH

DATA ENTRY COMPLETE

WHAT'S NEXT?

Now that you have submitted this record set, what do you do now?

[Complete another parameter using the same Sampling Details](#)

or

[Enter New Data](#)

or

[Log Out](#)

COMPLETE TEST DATASHEETS

DATASHEET: pH

TEST PARAMETERS

STEP ONE: Enter your sampling equipment

Sampling Equipment:

STEP TWO: Enter up to three (3) samples into the boxes provided in the table

Sample 1:

Sample 2:

Sample 3:

Ave. pH:

STEP THREE: The average of your samples will be used to generate a Q value

Q Value:

Q 12 Weighting Factor:

WQS:

STEP FOUR: Click the Continue button to save your results for entry in the database

CONTINUE

SEARCH DATABASE

With over 10,000 record sets in the Hoosier Riverwatch Database, finding data specific for your group, location or even as an individual could be a daunting challenge. However, the Search and Filter Feature will allow users to find all information quickly and easily.

Select the Search Database link at the top of the Hoosier Riverwatch main page will take you into our Search and Filter Datasets page. There are presently 5 ways in which volunteers can retrieve information.

SEARCH BY SITE ID EXAMPLE



The screenshot shows a web form titled "Search By Site ID" in a light blue header. Below the header, there is a text input field for "Site ID:". Underneath that is a dropdown menu for "Data Type:" with "Select" and a downward arrow. Below the dropdown are two radio buttons for "Output Format": "Excel" (which is selected with a green dot) and "HTML with Filter function" (which is unselected with a grey dot). At the bottom of the form is a button labeled "Search By Site ID".

In order to search by Site ID, one needs to only know a valid Hoosier Riverwatch Site ID. In most cases this will be a Site ID that has been created by you. You can also use the DataWatch feature of the Riverwatch website to find specific sites that you may be interested in learning more about. Use the mapping function of DataWatch to find Site IDs and return here to gather the datasets.

Once a Site ID has been entered in the box above, a **Data Type** must be selected (Chemical, Habitat, Invertebrate, Flow). The final choice of the search is to choose an **Output Format**. Choosing **Excel** will produce you a Microsoft Excel worksheet with all the raw data that matches your search criteria. You may simply download this sheet and open in Microsoft Excel to view the data. The Excel sheet contains ALL details from the sampling including weather, notes from the volunteer, number of people at the sampling site etc. It is the most comprehensive data search available in the system.

The second choice under Output Format is **HTML with Filter Function**. Selecting this option will return you data in an html table where you have further filtering functions. See the following image depicting the results of a Site ID/Chemical/HTML with Filter.

CHEMICAL TEST DETAILS

Use the Search box below to narrow the choices down in this list. You may also sort the results of the table by clicking the top headers of each column.

Search Chemical Data

Contains: ☒

[Clear Search](#)

SITE ID	COUNTY	RIVERNAME	VOL ID	DATE SAMPLED	WQI	
326	Shelby	Little Blue River	587	8/19/2004	69.19	View Details
326	Shelby	Little Blue River	266	8/10/2006	66.55	View Details
326	Shelby	Little Blue River	785	10/13/2008	74.09	View Details
326	Shelby	Little Blue River	785	12/12/2008	NaN	View Details
326	Shelby	Little Blue River	785	2/9/2009	62.73	View Details
326	Shelby	Little Blue River	785	6/15/2009	69.64	View Details
326	Shelby	Little Blue River	785	8/12/2009	69.79	View Details
326	Shelby	Little Blue River	785	10/13/2009	72.94	View Details
326	Shelby	Little Blue River	785	12/14/2009	64.64	View Details
326	Shelby	Little Blue River	785	3/8/2010	63.31	View Details
326	Shelby	Little Blue River	785	4/15/2010	66.8	View Details
326	Shelby	Little Blue River	785	6/21/2010	61.27	View Details
326	Shelby	Little Blue River	785	8/24/2010	73.27	View Details
326	Shelby	Little Blue River	776	10/25/2006	84.57	View Details
326	Shelby	Little Blue River	776	3/30/2007	90.2	View Details
326	Shelby	Little Blue River	776	8/15/2007	85.2	View Details
326	Shelby	Little Blue River	776	4/22/2008	73.4	View Details
326	Shelby	Little Blue River	776	8/4/2008	74.94	View Details
326	Shelby	Little Blue River	776	10/16/2008	NaN	View Details
326	Shelby	Little Blue River	776	12/12/2008	NaN	View Details
326	Shelby	Little Blue River	776	4/17/2009	NaN	View Details

In this example, there were multiple samples taken at site 326. At any time you may sort the data from low to high values of any column by clicking on the column header. If you wanted to know the highest WQI score for this site, simple click the WQI header and the data would sort in order from highest to lowest. At any time you want to view more details about specific dataset, you can click the View Details which would show you specifics from that sample.

Yet another feature of the HTML with Filter is the ability to quickly filter down datasets. In the example above you will see that site 326 is actually sampled by 4 different individuals. Look what happens if you type 776 in the Search Chemical Data field.

CHEMICAL TEST DETAILS

Use the Search box below to narrow the choices down in this list. You may also sort the results of the table by clicking the top headers of each column.

Search Chemical Data

Contains: ☒

[Clear Search](#)

SITE ID	COUNTY	RIVERNAME	VOL ID	DATE SAMPLED	WQI	
326	Shelby	Little Blue River	776	10/25/2006	84.57	View Details
326	Shelby	Little Blue River	776	3/30/2007	90.2	View Details
326	Shelby	Little Blue River	776	8/15/2007	85.2	View Details
326	Shelby	Little Blue River	776	4/22/2008	73.4	View Details
326	Shelby	Little Blue River	776	8/4/2008	74.94	View Details
326	Shelby	Little Blue River	776	10/16/2008	NaN	View Details
326	Shelby	Little Blue River	776	12/12/2008	NaN	View Details
326	Shelby	Little Blue River	776	4/17/2009	NaN	View Details

The same dataset has suddenly been reduced to show only those samples taken from Vol ID 776! You could then sort the highest WQI score for just that individual at site 326.

In this example above, the dataset was fairly small and organized. What if you searched for chemical data in the entire Upper White watershed? Your dataset would be much larger and have more variability to it. In that case you could use the search feature to narrow the set down in a specific county in that watershed!

WHICH TO USE AND WHEN?

The ability to save a dataset out to Microsoft Excel is indeed a powerful function. However, sometimes the steps taken to get a small amount of data out of that sheet are not worth the effort. This is where the HTML with Filter comes in.

When to use the HTML with Filter

- Simple see how many tests have been done at a particular location
- Looking for the last date of sampling in a dataset
- Looking for the high and low test scores in a certain test

When to use the Excel Output

- View very specific details of a dataset
- Want the ability to create charts and graphs from a dataset
- Want to compare two sets against each other

Another option is to use the HTML with Filter to see if the dataset does indeed include the test results you are looking for before you download the Excel sheet to your local machine.

DATAWATCH

Start | **Chart Parameter Averages** | **Compare Parameters** | **Review Data By Site** | **Explore Sites** | **My Favorites**

Load took 7.19 seconds

HOOSIER RIVERWATCH

Welcome to the Hoosier Riverwatch data explorer. Use the tabs across the top to carry out various data analysis tasks.

Chart Parameter Averages. Use this screen to get an overall view of the data. You can plot the monthly average for each parameter in a line graph. View the data state-wide, by watershed, by volunteer, or by your group of favorite sites.

Review Data By Site. Are you curious about how your new data compares to data already collected at your site? With this screen you can compare a set of samples to the average data values for a site, or in a watershed, or state-wide.

My Favorites. Select sites that are of interest to you. Use this group of sites in other data analysis tasks.

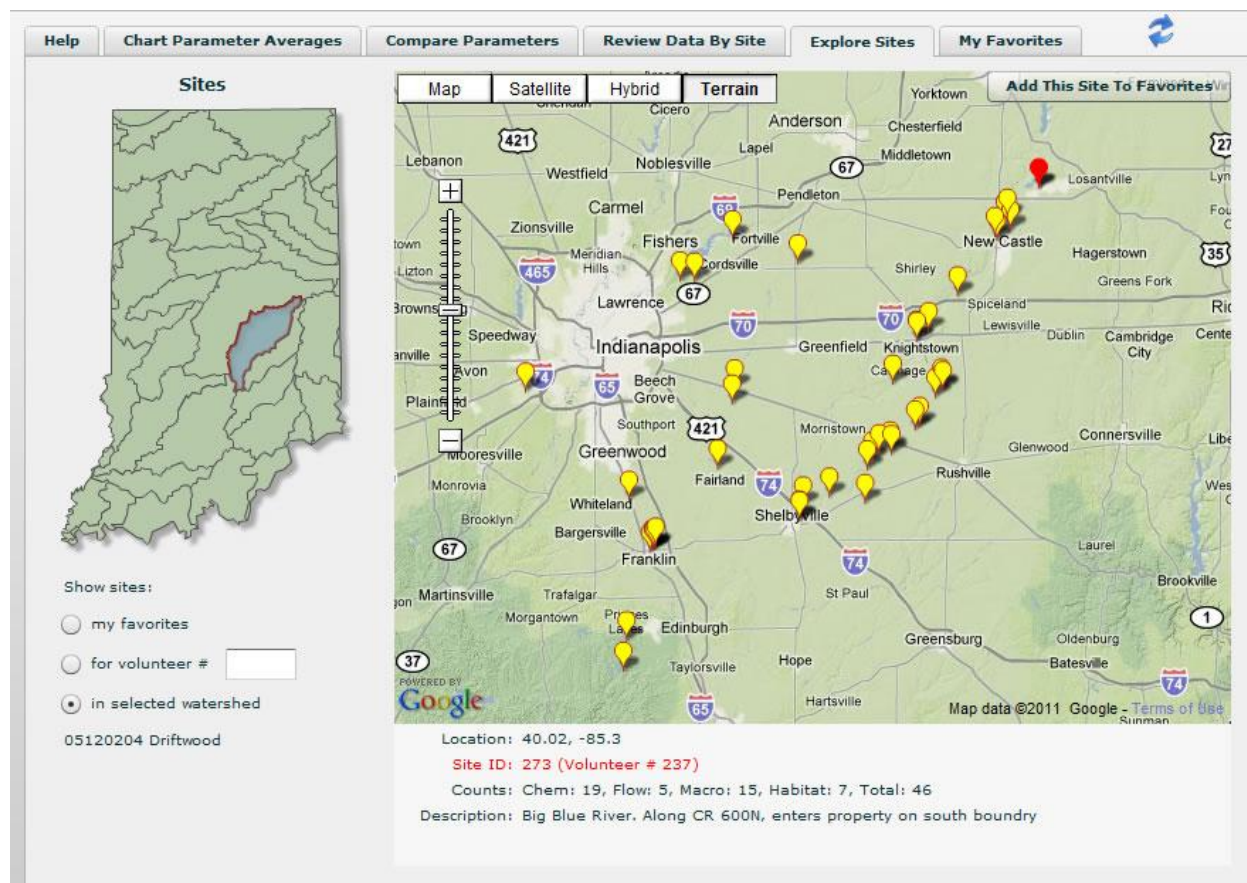
Explore Sites. Visit your site on a map. Discover your neighboring sites. You can also use the map to add sites to your group of favorites.

Compare Parameters. With this screen, you can compare the overall shapes of any two parameters, plotted on a single chart. You can plot the data for the state as a whole, or limit the display by watershed, volunteer, or a group of your favorite sites.

For More Help. You can find the complete manual for the data explorer here.

Go

EXPLORE SITES



Use the Explore Sites screen to get an overall picture of the existing Hoosier Riverwatch sampling sites, or to find sites near your neighborhood.

VIEWING THE SITES

To plot a group of Hoosier Riverwatch sites, use the map on the left to select a watershed. The individual sites for that watershed will appear on the larger map, and that map will center itself to show the sites. It's also possible to see just those sites associated with a particular volunteer. Just enter the volunteer's id number in the type-in box and hit the Enter key. If you have a group of favorite sites defined for this session, selecting the "my favorites" button will plot those sites on the map.

MANIPULATING THE MAP

The sites are displayed using Google maps, and the controls are probably familiar to you. Use the buttons at the top-left corner of the map to choose between different views of Indiana. Zoom in and out using the "+" and "-" buttons or the set of vertical steps.

If you mouse-down (click with the left button) anywhere on the map and then move your mouse, you'll move the map, dragging it along with your mouse. You can also double-click anywhere on the map. The view will zoom in to the location where you clicked, and that map location will move to center stage. Finally, if your mouse has a scroll wheel, you can use that wheel to zoom in, or zoom out, on the map.

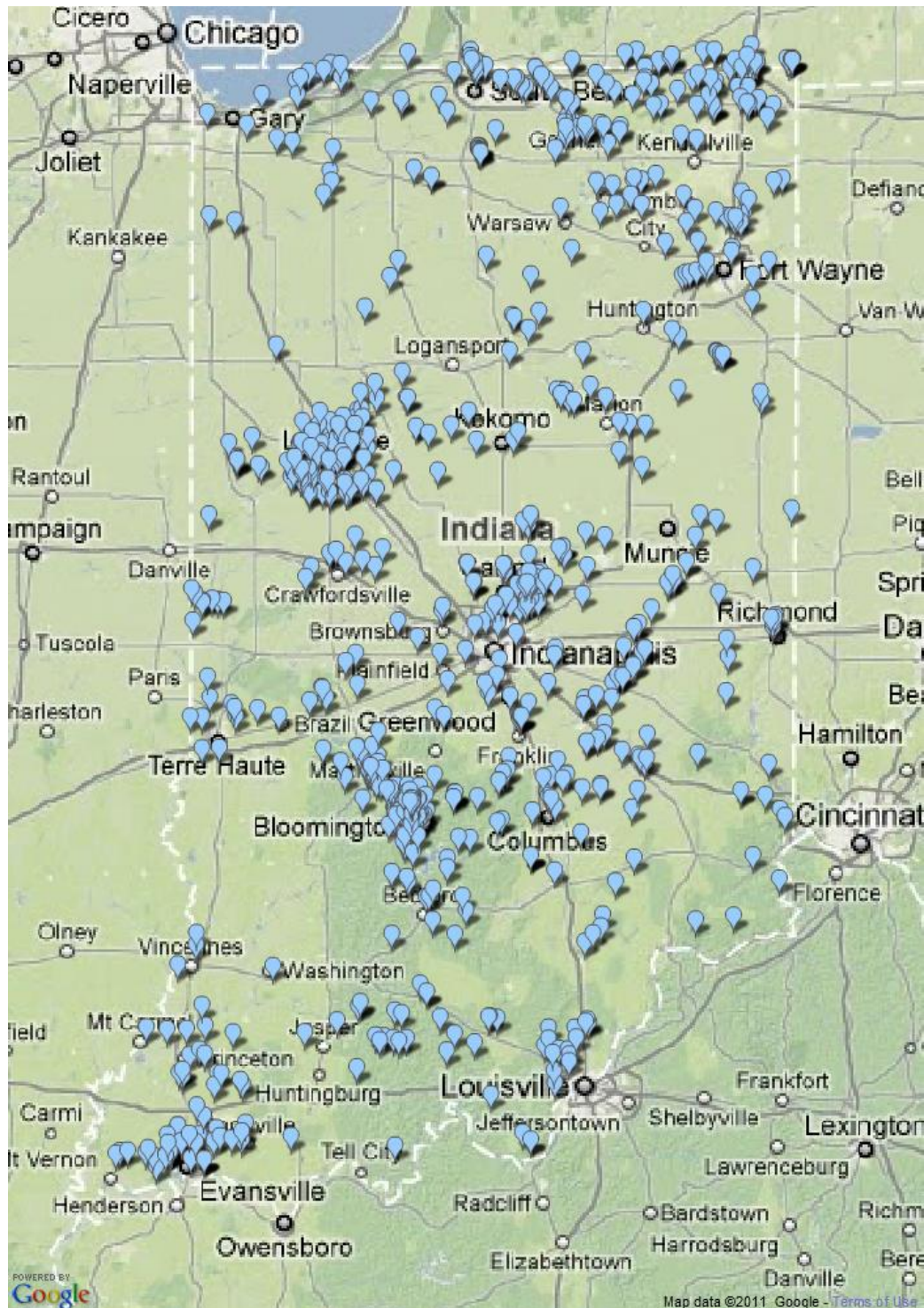
You can get information about a site by clicking on the yellow site icon. When you select a site, its icon turns red. Detailed information about that site appears in the panel below the large map. For each site, the information includes the location of the site (its latitude and its longitude), a site description, the id number of the site, and the id number of the volunteer who first registered this site. The number of times that the site has been sampled is also shown.

ADDING A SITE TO FAVORITES

Notice the button in the top-right corner. Clicking that button will add the currently selected site (if you have one) to your group of favorites. More information about favorite sites is in the next section.

THE BIG PICTURE

The Explore Sites screen doesn't support plotting all of the Hoosier Riverwatch sites at once. Here's a snapshot of all sites in the system through the end of 2010.



MY FAVORITES

[illegible]

The My Favorites panel lets you manage sites that are especially interesting to you. You can create a group of My Favorites and use them in a single session. You can also save multiple groups of favorite sites to your computer for use in subsequent sessions.

Use the My Favorites screen to view and manage your favorite sites. On any other screen in DataWatch, the phrase "My Favorites" refers to your current group of favorites, as shown on this screen. On the My Favorites screen, the table on the left lists the sites that are currently part of your group of Favorites. The table shows the site id, the id number of the volunteer who first registered the site, the 8-digit HUC, and the number of times that observations have been made at that site.

In the table, if you click on any of these sites, more details of the site are shown in the box labeled *Site Details*.

MANAGING YOUR FAVORITES

There are a number of ways to manage your favorite sites. You can add sites to a group or delete sites from a group. You can also save a group of sites for later use.

ADDING SITES

There are a number of ways that you can add sites to your group of favorites:

- Use the Add Site to My Favorites button on the map section of the Explore Sites panel.
- If you know the id number of a site, you can add it to your favorites by using the type-in box next to the button that reads Add this Site to my Favorites.
- You can also add all the sites registered by a particular volunteer. Enter the volunteer's id number in the type-in box next to the button that reads Add Sites from this Volunteer.

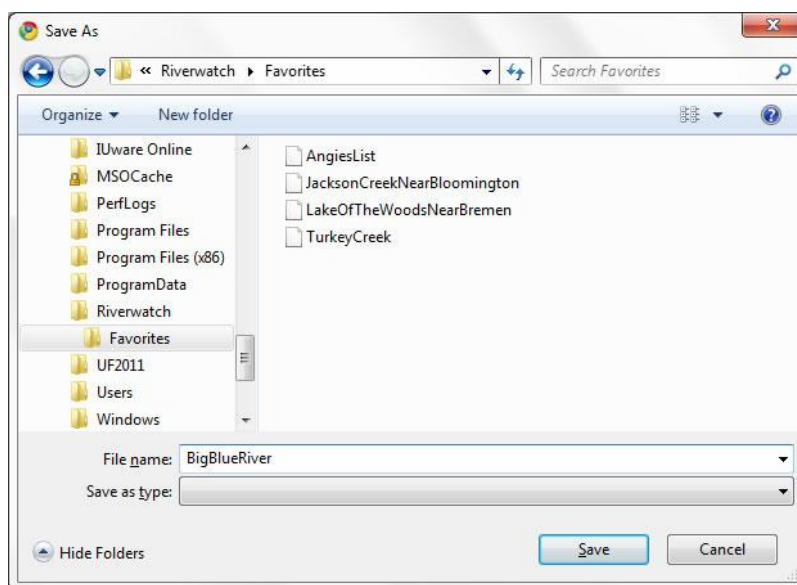
DELETING SITES

To delete sites from your group of favorites:

- Select a site from the left-hand table and its details showing in the Site Details box, use the button labeled Delete this Site from my Favorites.
- Click the button labeled Delete ALL Sites from my Favorites to do exactly that.

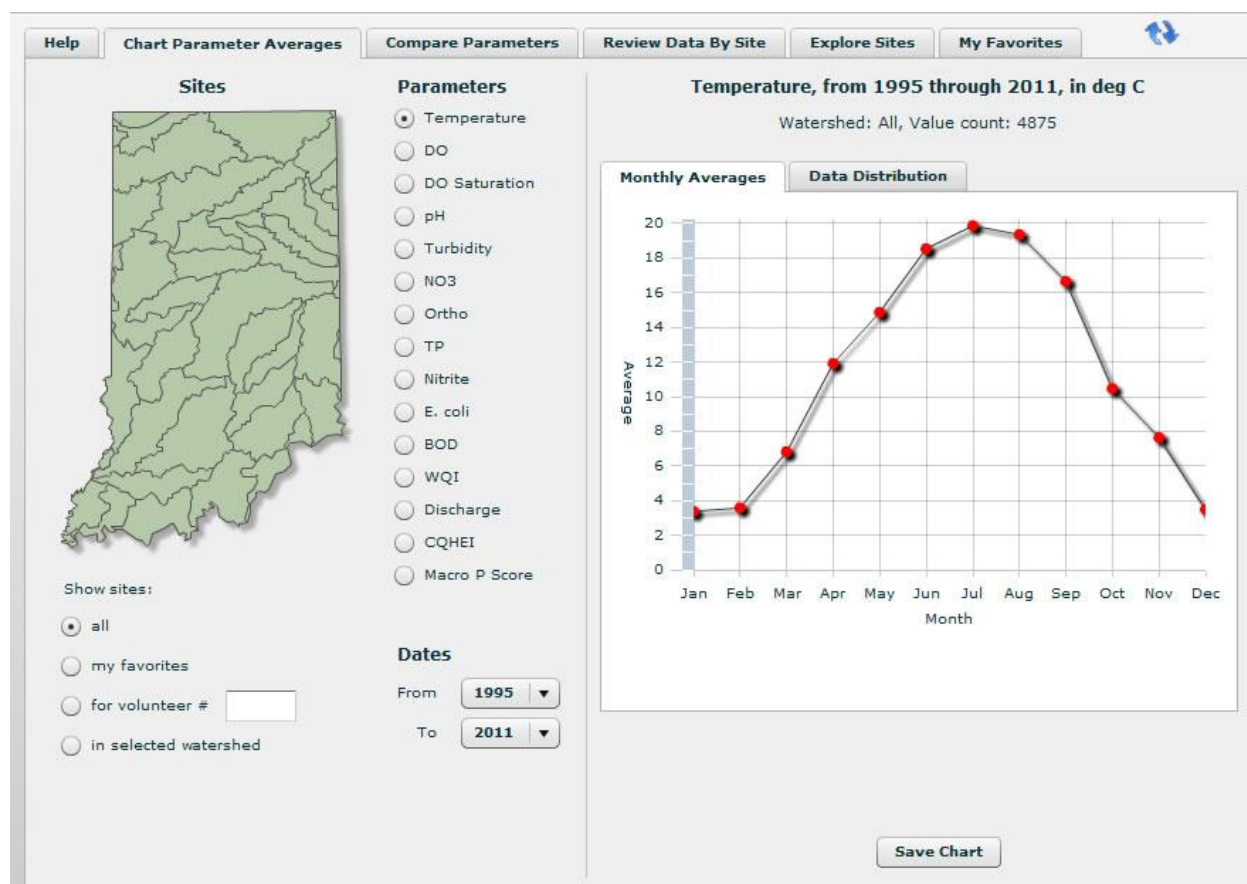
SAVING AND LOADING GROUPS OF SITES

You can save a group of sites that are interesting to you for later use and re-use. Just use the button labeled “Save My Favorites”. As shown in the picture below, a popup box will appear. Use the pop-up to name and save the file to your local computer.



To re-load those sites in a subsequent session, just use the “Load My Favorites” button on the My Favorites panel.

CHART PARAMETER AVERAGES



The Chart Parameters panel plots the month-by-month averages of a single parameter as observed in Hoosier Riverwatch sites.

You can specify that all of the Hoosier Riverwatch sites be included in the chart, or you might limit which sites are included. To include only the data from a particular watershed, select the watershed using the map of Indiana's watersheds.

You can also select sites by supplying the id number of a volunteer in the type-in box and hitting the Enter key. Or, if you have a group of Favorites in this session, you can limit the data included in the chart to those sites.

The parameters available for charting are listed to the right of the map. You can restrict the time period for which data is charted, by manipulating the drop-down boxes labeled Dates.

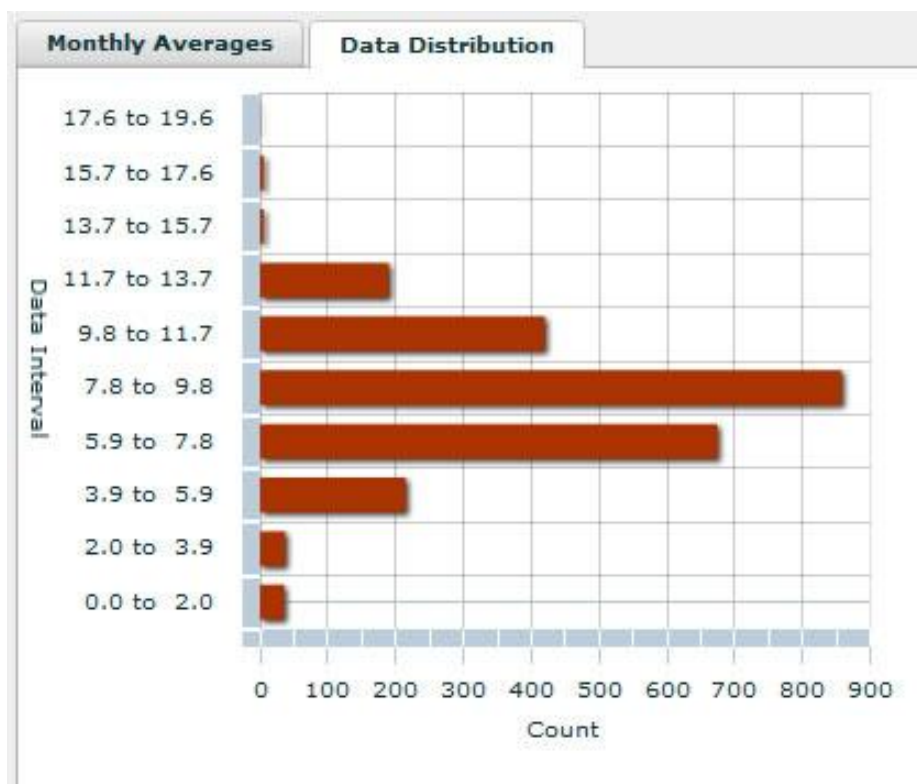
A chart of the data appears on the right side of the panel. The data is plotted using the minimum and maximum values found in the data set.

You can interact with the Monthly Averages chart to get a bit more detail. If you position your mouse inside a data marker, a small pop-up will show the data value. A count of how many observations account for that data value also appears.

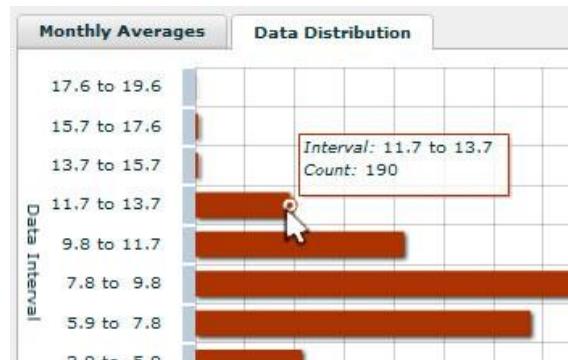


DATA DISTRIBUTION

A chart showing the distribution of the data is also provided. The data range is divided into ten intervals. Click the tab labeled *Data Distribution* to see a chart similar to this:



The Data Distribution chart is also interactive. If you position your mouse at the end of a bar, you'll see the count of samples that are in this interval.

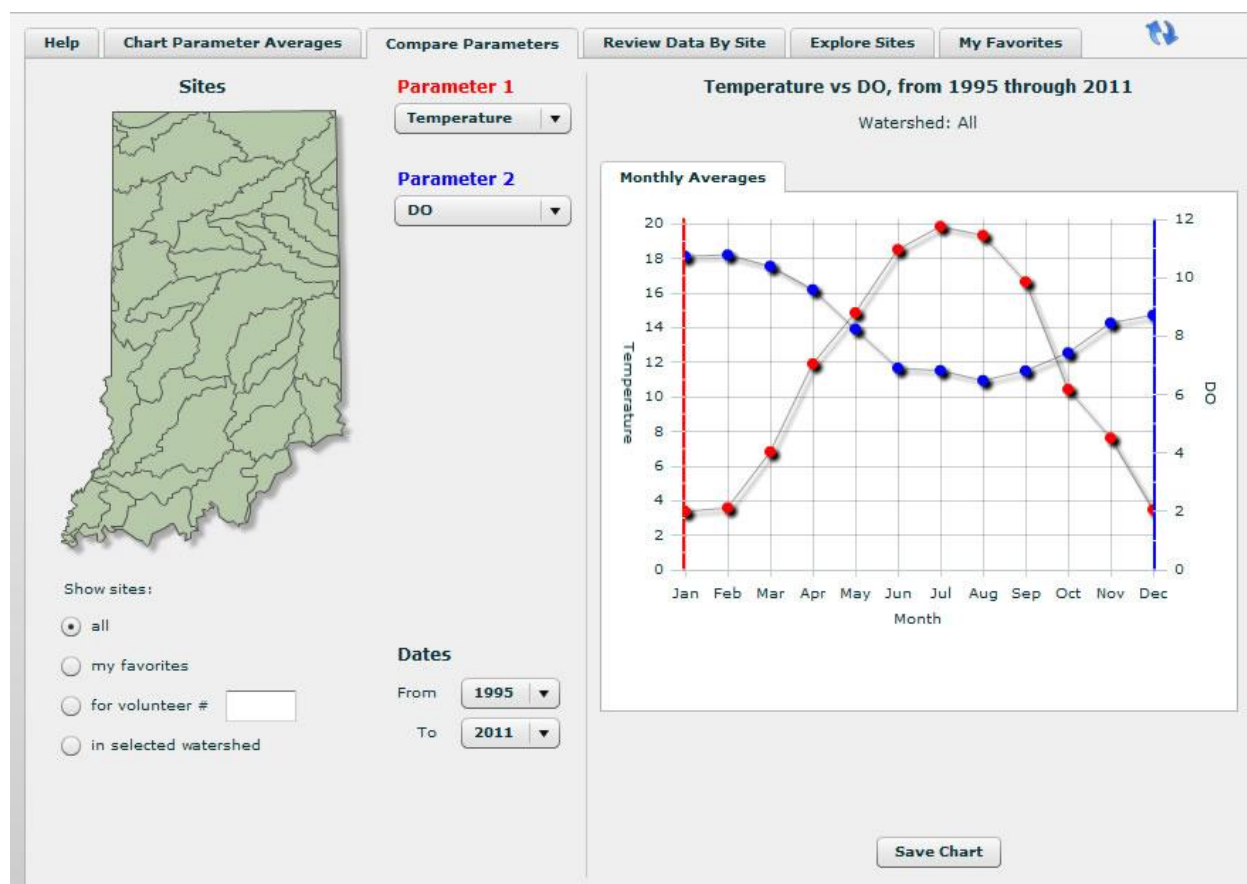


SAVING THE MONTHLY AVERAGES CHART

To save a copy of the monthly averages plot, click the "Save Chart" button. A pop-up box will appear where you can supply a name and a location. The chart will be saved as a file of type "jpg". You can use this image in other programs, including Microsoft Word and PowerPoint.

Currently, DataWatch has no way to help you save the Data Distribution chart as a jpg file. You can, of course, do a screen capture of your screen.

COMPARE PARAMETERS

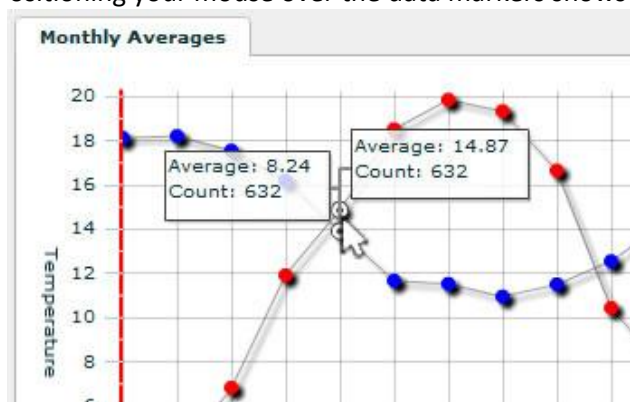


The Compare Parameters screen lets you explore the relationship between parameters by charting any two parameters on a single chart.

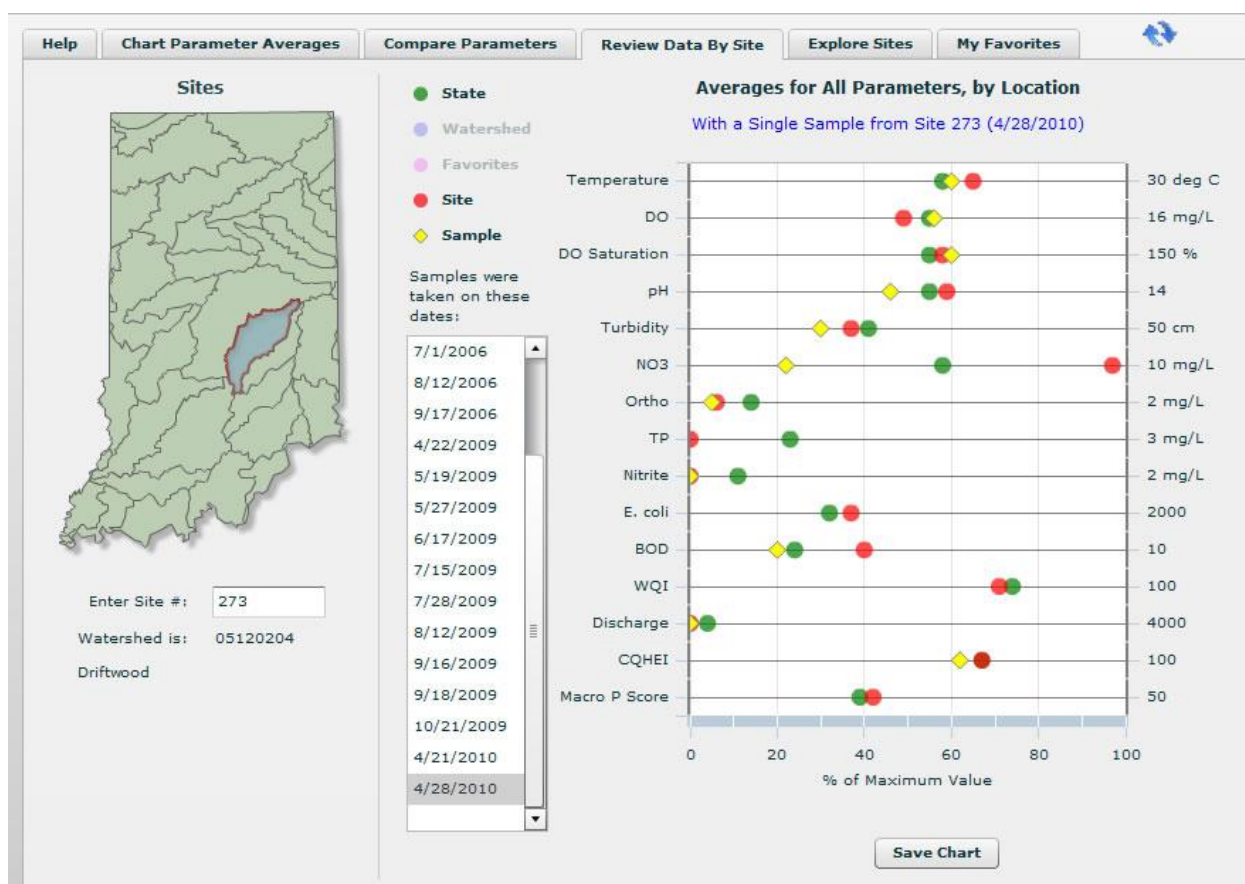
In terms of user interface, this screen is very similar to the screen for charting monthly averages of data observations.

The only significant change is that the listing of parameter names has been replaced by two drop-down boxes. Parameter 1 will be plotted against the left (red) axis, using red markers. Parameter 2 is plotted against the right (blue) axis, using blue markers.

The Compare Parameters chart is also interactive. Positioning your mouse over the data markers shows the actual value and a count of observations that account for this value.



REVIEW DATA BY SITE



Have you ever wondered how your newly-collected data compares to data previously collected at a site, or in a watershed? The "Review Data By Site" screen can plot your data along with the average of data collected previously at this site, or in this watershed, or across the State.

SELECTING A SITE

To review data for a site, enter the id number for the site in the type-in box labeled Enter site # (below the map). The watershed containing the site will highlight, and the watershed HUC and name will appear under the type in box. In addition, any data for this site will be retrieved and the sampling dates will be listed in the scrollable box.

INTERACTING WITH THE CHART

In the chart, each parameter is plotted on a horizontal line. The maximum value expected for a parameter is shown at the far right side of the parameter's axis, along with the units of measure.

Various data values are plotted along each line horizontal line. For example, for each parameter, the State-wide average is plotted using a green circle. The average for the watershed is plotted as a blue circle. As shown in the legend, the average for your current group of favorite sites is plotted in magenta. The average for all data collected at the site is shown in red. Finally, the individual data values for the selected sampling date are plotted using a yellow diamond.

As shown in the legend, data values for a particular sampling date are plotted along with the averages for the State, the watershed, your favorites, and the site.



As with the other charts, this chart is interactive. This chart compares the average values at the site with the average of the overall watershed. The pop-up shows the data values.

